ABSTRACT

The present invention is carried out to improve the starting capability of a fuel cell at low temperatures. The fuel cell system comprises a fuel cell 1 which generate electric power by supplying hydrogen gas and a oxidant gas, a hydrogen gas passage 10 for supplying hydrogen to the fuel cell 1, a hydrogen off gas
circulation passage 20 for returning the hydrogen off gas to the hydrogen supply flow path 10, a hydrogen pump 7 provided at the hydrogen gas off gas circulation passage 20 for boosting the hydrogen off gas, a hydrogen off gas bypass passage 22 for returning the hydrogen off gas to the hydrogen supply flow path 10, an ejector 6 for sending hydrogen off gas in the hydrogen off gas bypass passage 20 provided in the hydrogen gas supply flow path 10 to the hydrogen supply flow path 10.